

ABSTRACT

The present invention is a processing method of particulate dust in plasma, in which the particulate dust in plasma is processed when a substrate to be processed is arranged in the high vacuum enclosure, plasma is generated in the high vacuum enclosure, and a reactive material is appropriately introduced into the high vacuum enclosure to perform processing of the substrate to be processed. At least one collecting electrode is provided around the substrate to be processed in the high vacuum enclosure other than the electrode that generates plasma, and particulates generated in plasma are efficiently removed by applying a predetermined electric potential of a direct-current or an alternating current to the collecting electrode, and thus a deposition problem onto an inner wall of the vacuum enclosure and a deterioration problem of processing accuracy and a film quality associated with flowing of the particulates onto the substrate are solved.